

Student Roll No.					Example Roll No				
					2	3	4	7	2
0	0	0	0	0	0	0	0	0	0
1	1	1	1	1	1	1	1	1	1
2	2	2	2	2	●	2	2	2	●
3	3	3	3	3	3	●	3	3	3
4	4	4	4	4	4	4	●	4	4
5	5	5	5	5	5	5	5	5	5
6	6	6	6	6	6	6	6	6	6
7	7	7	7	7	7	7	7	●	7
8	8	8	8	8	8	8	8	8	8
9	9	9	9	9	9	9	9	9	9

پال میں موبائل فون لانا ہلکے سے ← Paper Code: 74

MRD-XII-17 (A)
CHEMISTRY - (Part-II)
(Fresh / New Course)

Total Time: 3hrs

Total Marks:85



CH12A

FILL ROLL NO. COLUMN WISE FROM LEFT TO RIGHT ACCORDING TO EXAMPLE SHOWN ABOVE.

Time: 20min

"SECTION - A"

Marks: 18

NOTE: Use Black/Blue marker for shading only one bubble for each question. No mark will be awarded for Cutting, erasing, overwriting, and multiple bubble shading.

Q. 1 Choose the correct option i.e. A,B,C, and D.

- Acetic acid can be obtained from CH_3MgBr by treatment with
 A CO_2 B H_2O C HCHO D ClCN
- Which substance is used to convert alcohol to alkyl halide?
 A SOCl_2 B PCl_5 C $\text{HCl} + \text{ZnCl}_2$ D All of these
- 1,4-dimethyl benzene are also called
 A o-xylene B p-xylene C m xylene D p-toluene
- Geometry of SiO_2 is
 A Trigonal B Tetrahedral C Pyramidal D Angular
- The fractional distillation of coal tar gives
 A Methane B Toluene C Coke D Ammonium sulphate
- C-O bond length in phenol as compared with methanol is
 A Greater B Lesser C Same D Variable
- Which ions used as catalyst in the reaction between iodide ions and persulphate ions?
 A Chromium B Iron C Copper D Chlorine
- Which of the following hydrocarbon produces an NMR spectrum with more than one peak?
 A Methane B Ethane C Butane D Cyclobutane
- In Wolf Kishner reaction, aldehydes are converted to
 A Alkane B Alcohols C Ethers D Esters
- Trypsin is present in
 A Stomach B Saliva C Bile D Pancreatic juice
- The hemolytic fission of C-C bond in ethane gives an intermediate in which carbon is hybridized
 A sp^3 B sp^2 C sp D sp^2d
- The compound imines are also known as
 A Schiff's base B Bronsted base C Lewis base D Lewis acid
- Temperature range of stratosphere is
 A 15 to -52°C B -56 to -2°C C -52 to -2°C D -2 to 92°C
- Welding gas formula is C_2H_2 . Its name is
 A Methane B Ethane C Butane D Ethyne
- Most abundant carbohydrate in nature is
 A Cellulose B Pectin C Chitin D Glycogen
- The inter pair effect dominates in
 A Sn B S C C D Pb
- The compound with highest boiling point is
 A Acetic acid B Ethyl alcohol C Water D Ether
- The oxidation state of Chromium in CrO_2Cl_2 is
 A 4 B 6 C 5 D 2

CHEMISTRY- (Part-II)
(Fresh / New Course)

Time Allowed: 2:40 Hrs

Section - B & C

Total Marks: 67

"Section - B"

Marks: 40

Q. 2 Write short answer of any TEN of the following parts. Each part carries equal marks.

- (i) What is electron affinity? Compare E.A value of group VI and VII.
- (ii) Draw a molecular orbital diagram of benzene.
- (iii) What are hydrocarbons? How they are classified?
- (iv) What is condensation polymerization? Give examples of formation of Nylon 6, 6.
- (v) State the medical problem that may relate to calcium and phosphorus.
- (vi) Discuss the importance of Diazonium salt.
- (vii) Write the reaction of alcohol with SOCl_2 and PX_3 .
- (viii) Differentiate between aldose and ketose.
- (ix) Why amines are more basic than ammonia?
- (x) Carboxylic acids have high boiling point than corresponding alcohols. Why?
- (xi) Discuss hydration of alkyne.
- (xii) Why the compound of transition are mostly coloured?
- (xiii) Write note on: i) Decarboxylation ii) Esterification

"Section - C"

Marks: 27

NOTE: Attempt any THREE questions. Each question carries equal marks.

- Q. 3:** a) What is orientation? Discuss orientation effect for disubstitution on benzene ring.
b) Write any three methods for preparation of carboxylic acid.
- Q. 4:** a) How Beryllium differ from other members of group II?
b) Discuss the reaction of Grignard reagent with the following:
i. Aldehydes ii. Esters iii. CO_2 iv. Ketone
- Q. 5:** a) Write note on any TWO of the following.
i) Water pollution
ii) Colors and shapes of complex ion
iii) Application of spectroscopy
- Q. 6:** a) Write the structural formulae of the following names:
i. Oxalic acid ii. 4-methyl-2, 3-hexadiene iii. 3-phenylpentane
iv. Chloromagnesium acetate
b) Name the following compounds according to IUPAC system:

